



**3M** Certified Dealer / Applicator  
Window Film Solutions

# Welcome to Eco Glass

**Eco Glass** is fully licensed and authorized by **3M** to provide our clients with their top-tier products and provide direct **3M** warranties. Eco Glass has been working with window films for over 15 years in both New Zealand and Hong Kong. Over the years our clients and projects have ranged from high-end art collectors to various government agencies, technical institutes, offices and home-owners who have been looking for ways to control heat and ultraviolet radiation within their premises whilst saving energy and costs at the same time.



## Our Warranty

**3M** & Eco Glass ensures a **5 - 10 YEARS PRODUCT & 10 YEARS INSTALLATION** warranty for peace of mind.



## Our Team

Eco Glass has extensive **15 YEARS'** experience and knowledge in the window film industry both in **HONG KONG & NEW ZEALAND**.



## Our Company

Eco Glass is the leading **WINDOW FILM INSTALLATION** company targeting pre-existing, new build residential domiciles & commercial spaces.



# 3M Film Benefits



## INCREASE EFFICIENCY

Energy bills can significantly be reduced by simply applying **3M** solar window film to the windows. This is undoubtedly one of the main reasons why solar control films have become so popular for all properties, representing a rapid positive return on property owners' initial investment – savings in energy bills can be of as much as 30% of a standard bill.

## MAINTAIN APPEARANCE

**3M** Window Film has a neutral appearance and provides a high solar heat reduction. In general, the darker the film = the less heat and glare coming through the glass. However, with some of the newer films, a lot of heat is controlled with a much lighter film such as the **3M** Prestige 70 film which is nearly invisible.



## FADING PROTECTION

**3M** Window Films are designed to reduce the effects of solar heat and visible light on your furnishings and will block up to 99% of the sun's harmful ultraviolet rays, which are the single largest cause of fading.

## Savings you can see.

### GET A FAST PAYBACK WITH SIGNIFICANT SAVINGS.

The Department of Energy considers window film a top-tier technology for energy conservation with one of the fastest paybacks – approximately three years. Upgrading your windows with **3M** Window Film can help you achieve significant savings. You could save \$1 to \$2 per square foot of film installed, or as much as 19 kWh per square foot of glass. Building owners around the world are already taking advantage of these savings – isn't it time you did too?

Reduce heat gain in summer months by up to 79%

Save as much as 19 kWh per square foot of glass

Fast payback – as little as 3 years

Many utility companies offer incentives

**3M** Window Films are proven to save energy in all climate zones

**3M** can complete an Energy Plus energy audit on your building to calculate your projected savings

### REDUCE YOUR ENERGY USE AND YOUR CARBON EMISSIONS.

Taking control of your environment with **3M** Window Films is better for our environment. By rejecting the heat of the sun, you use less energy. By keeping your window treatments open, you use less electric lighting and save on energy costs. By upgrading your existing windows, you're keeping them out of the landfill.

Keep your existing windows

Reduce light pollution

Let in natural light while rejecting heat

Lower your energy consumption

Help qualify for LEED credits

**3M** Window Films can become carbon negative in as short as 6 months from install

Eco Glass is under the **3M** Window Film Authorized Applicator Program and the **3M** technical team regularly conduct site visits and inspections to ensure workmanship and finishing is to the highest standards.



# Government Tax Incentives & Funding Assistance

In the “Hong Kong’s Climate Action Plan 2030+”, the HKSAR Government has set a target of 65% to 70% reduction of carbon intensity by 2030 using 2005 as the base year. This plan revealed that buildings consume about 90% of electricity in the territory. Here are some subsidies for energy-saving improvement works in communal areas of residential, commercial and industrial buildings.

## **ACCELERATED DEDUCTION UNDER PROFITS TAX : ENERGY EFFICIENCY REGISTRATION SCHEME FOR BUILDINGS (HKEERSB)**

With effect from 1 January 2018, new or existing buildings/premises that have achieved Final Bronze rating or above under BEAM Plus NB, EB or BI are eligible to register. Capital expenditure incurred in the installation/construction of energy efficient building installations registered under HKEERSB is eligible for accelerated deduction under profits tax.

### **BEAM PLUS**

Globally, there are a number of localised green building certification systems, which are independent tools that could showcase and compare the environmental performance of buildings, such as BREEAM for United Kingdom and LEED for United States. In Hong Kong, BEAM Plus is the current assessment tool adopted in the market.



### **CLP SUBSIDY - ECO BUILDING FUND**

Up to HK\$500,000 in subsidies for energy-saving improvement works.

Under the CLP Eco Building Fund, residential, commercial and industrial buildings can receive subsidies for energy-saving improvement works. The fund awards up to HK\$100 million every year. Through the fund, we hope to subsidise 400 buildings a year and save up to 48 gigawatt hours.



### **HK ELECTRIC SMART POWER FUND**

Energy Efficiency Enhancement Projects

Communal building services installations (e.g. lighting, air-conditioning, lift, escalator, electrical installation, etc.) retrofitting, retro-commissioning (RCx) or building-based smart technology projects.



# Jockey Club BEAM Plus in Schools Project

Schools and universities consume about 4% of the electricity in the public sector of existing buildings. Funded by The Hong Kong Jockey Club Charities Trust, the "Jockey Club BEAM Plus in Schools Project" is launched to assist 120 Primary and Secondary schools in Hong Kong to reduce carbon footprint and to promote the concept of green building to the next generation.



This pioneering project assists the participating schools on various enhancement including the replacement works of energy efficient equipment. A tailored BEAM Plus assessment tool for existing schools will also be created to assist schools in acquiring the BEAM Plus certification. In this project, Eco Glass has been responsible for the application of **3M** window film to over 30 schools.

## LOW CARBON RETROFITTING EQUIPMENT – SOLAR CONTROL WINDOW FILM

Installing solar control window film can avoid the incremental increase in room temperature by reducing solar radiation entering the room. Air-conditioners therefore can use less energy to maintain cooling at indoor environment, to save energy and reduce carbon emissions.

After Business Environment Council's site inspection and evaluation at the participating schools, the **3M** solar control window films will be applied on the windows with strong sunlight. Together with the low carbon equipment in our project, schools' energy efficiency will be enhanced significantly to achieve net-zero carbon emission.



Installed over  
30 schools for over  
**6,000m<sup>2</sup>**  
in 2021-2022





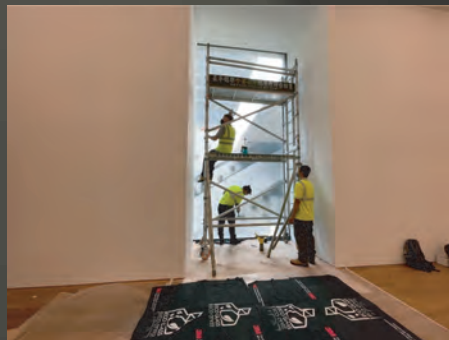
## Revitalisation of Industrial Buildings 活化工廈

Eco Glass is proud to be part of the Government of the HKSAR for revitalization of Kader Building in Kowloon Bay. The project was completed in early 2022 and has been seen to reduce carbon emission intensity by 5% when compared with the baseline in 2021.

Installed  
12 floors for over  
**1,700m<sup>2</sup>**  
in 20 days



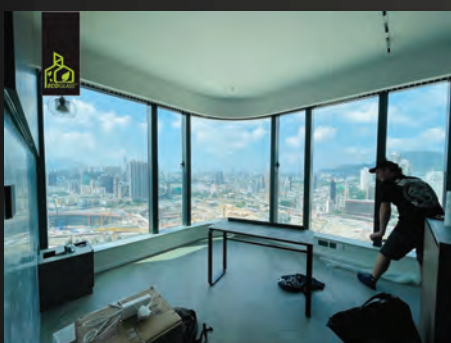
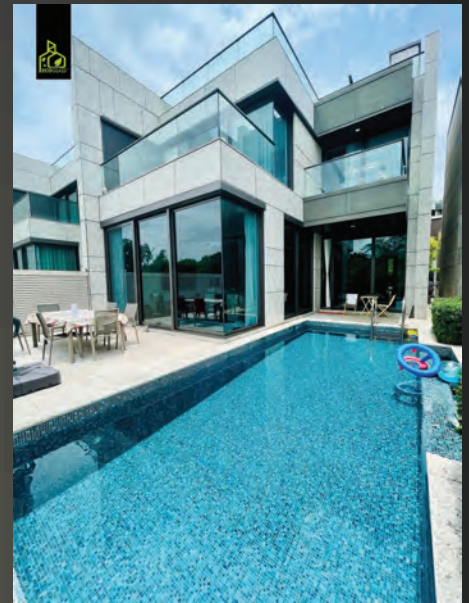
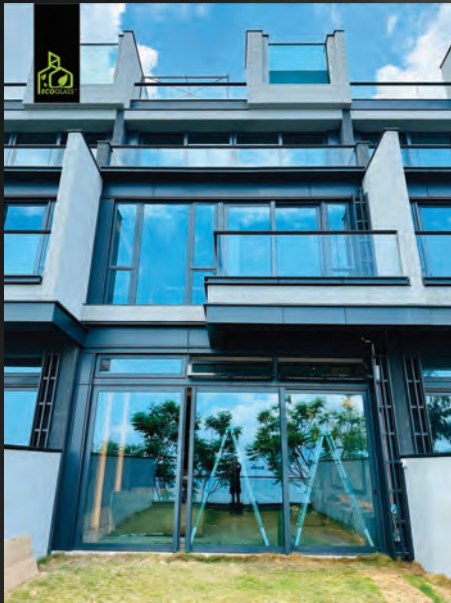
## M+ Museum, West Kowloon Cultural District





# Residential Projects

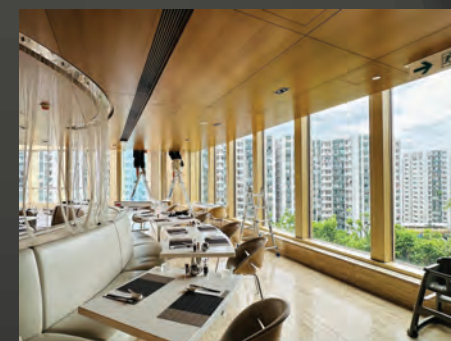
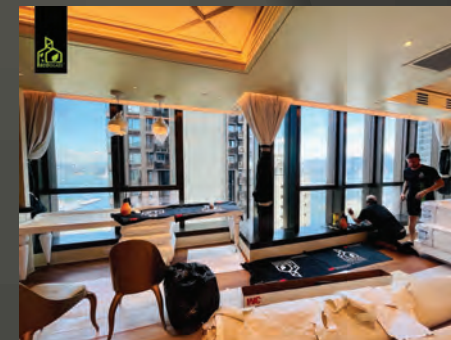
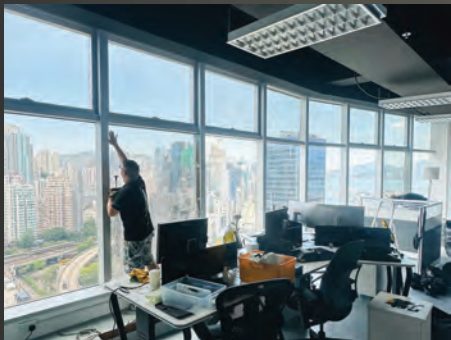
Our team of professional installers at Eco Glass works territory-wide across Hong Kong, Kowloon and the New Territories. Whether large or small scale, our team is committed to giving our clients the highest quality film installation.





# Commercial Projects

We have a wealth of expertise and experience in commercial installation projects. The team is well skilled in warehouse, factory, commercial office, hospital, institutional, educational, storage and mercantile buildings and our experts are ready to present and recommend any type of 3M film to suit your buildings needs.





**3M** Science.  
Applied to Life.™



**Let in the light. Not the heat. Superior comfort and clarity with 3M™ Sun Control Window Film Prestige Series.**

- ▶ High visible light transmission providing excellent aesthetics
- ▶ Up to 97% infrared rejection providing energy savings and enhanced comfort\*
- ▶ Low interior and exterior reflectivity enhances views while maintaining exterior appearance
- ▶ Non-metalized film with no signal interference and no chance for corrosion
- ▶ Helps extend the life of furnishings by significantly reducing harmful UV rays, the largest cause of fading
- ▶ The Prestige Series can become carbon negative in as short as 6 months from install\*\*
- ▶ Comprehensive warranty from **3M**

Visible Light Transmission ★★★★★

Low Reflection ★★★★★

Infrared Rejection ★★★★★

Best ★★★★★

Better ★★★★★

Good ★★★

Fair ★★

Not Recommended ★

*In comparison to other 3M Sun Control Window Films*

\*IR Rejection as measured from 900–1000nm

\*\* Based on emission calculations performed in compliance with the GHG Protocol Product Life Cycle Accounting and Reporting Standard (2011), third party assured by Quality Associates incorporated and energy savings calculation completed by CONSOL Energy. Contact 3M for details.



**Beauty and performance that metallic films can't match.**

Valued Associations and Alliances







## Product Performance and Technical Data

Glass Type (All 1/4")	Film Type	Visible Light			Total Solar Energy Rejected		Solar Heat Gain Coefficient (G Value)	U Value		Solar Heat Reduction	UV Light Rejected	Glare Reduction	Visible Light to Solar Heat Gain Ratio
		Reflected (Interior)	Reflected (Exterior)	Transmitted	Normal	60 Degree Angle		btu/hft <sup>2</sup> F	w/m <sup>2</sup> K				
Clear	PR20	5%	6%	21%	62%	65%	0.38	1.03	5.8	54%	99.9%	76%	0.6
	PR40	7%	7%	39%	60%	66%	0.40	0.99	5.6	50%		55%	1.0
	PR50	7%	8%	50%	56%	63%	0.44	0.99	5.6	46%		44%	1.1
	PR60	8%	8%	60%	53%	61%	0.47	0.99	5.6	42%		32%	1.3
	PR70	9%	9%	69%	50%	59%	0.50	0.99	5.6	38%		22%	1.4
Tinted	PR20	5%	5%	13%	64%	67%	0.36	1.03	5.8	43%	99.9%	76%	0.4
	PR40	6%	5%	24%	63%	67%	0.37	0.99	5.6	41%		55%	0.6
	PR50	6%	6%	30%	61%	66%	0.39	0.99	5.6	38%		43%	0.8
	PR60	7%	6%	36%	59%	63%	0.41	0.99	5.6	34%		32%	0.9
	PR70	7%	6%	42%	57%	63%	0.43	0.99	5.6	31%		22%	1.0
Double Clear	PR20	5%	13%	19%	50%	57%	0.51	0.47	2.7	28%	99.9%	77%	0.4
	PR40	8%	14%	35%	49%	54%	0.51	0.47	2.7	27%		55%	0.7
	PR50	9%	15%	45%	47%	53%	0.53	0.47	2.7	25%		44%	0.8
	PR60	11%	15%	54%	46%	54%	0.54	0.47	2.7	22%		32%	1.0
	PR70	13%	15%	62%	44%	50%	0.56	0.47	2.7	21%		22%	1.1
Double Tinted	PR20	5%	8%	11%	61%	68%	0.39	0.47	2.7	24%	99.9%	76%	0.3
	PR40	8%	8%	21%	61%	64%	0.39	0.47	2.7	23%		55%	0.5
	PR50	9%	8%	27%	60%	64%	0.40	0.47	2.7	22%		44%	0.7
	PR60	10%	8%	32%	59%	64%	0.41	0.47	2.7	20%		32%	0.8
	PR70	12%	8%	37%	59%	62%	0.42	0.47	2.7	18%		22%	0.9



## Enjoy enhanced views, savings and comfort with **3M™ Sun Control Window Film Night Vision™ Series.**

- ▶ Great heat rejection helps provide energy savings and improved comfort
- ▶ Enhanced views with low interior reflectivity, especially at night
- ▶ Helps reduce glare and eye discomfort
- ▶ Helps extend the life of furnishings by significantly reducing harmful UV rays, the largest cause of fading
- ▶ Excellent scratch-resistant coating
- ▶ **3M** nano-technology enhances color stability
- ▶ Comprehensive warranty from **3M**

Energy Savings ★★★★★

Heat Rejection ★★★★★

Glare Reduction ★★★★★

Interior Visible Reflection ★★★★★

Best ★★★★★

Better ★★★★★





Good ★★★

Fair ★★

Not Recommended ★

*In comparison to other 3M™ Sun Control Window Films.*

### Product Performance and Technical Data

Glass Type (All 1/4")	Film Type	Visible Light			Total Solar Energy Rejected	Solar Heat Gain Coefficient (G Value)	U Value		Solar Heat Reduction	UV Light Rejected	Glare Reduction	Visible Light to Solar Heat Gain Ratio
		Reflected (Interior)	Reflected (Exterior)	Transmitted			btu/ hft²F	w/ m²K				
 Clear	Night Vision 15	11%	38%	15%	72%	0.28	0.98	5.6	66%	99%	83%	0.5
	Night Vision 25	7%	19%	24%	61%	0.39	1.00	5.7	52%		73%	0.6
	Night Vision 35	7%	13%	36%	52%	0.48	1.03	5.8	41%		59%	0.7
 Tinted	Night Vision 15	11%	16%	9%	70%	0.30	0.98	5.6	52%	99%	82%	0.3
	Night Vision 25	7%	10%	14%	64%	0.36	1.00	5.7	43%		74%	0.4
	Night Vision 35	6%	8%	22%	58%	0.42	1.03	5.8	33%		58%	0.5
 Double Clear	Night Vision 15	11%	39%	14%	60%	0.40	0.46	2.6	43%	99%	82%	0.4
	Night Vision 25	8%	24%	22%	51%	0.49	0.47	2.7	29%		72%	0.4
	Night Vision 35	8%	19%	32%	45%	0.55	0.47	2.7	21%		60%	0.6
 Double Tinted	Night Vision 15	11%	17%	8%	68%	0.32	0.46	2.6	37%	99%	83%	0.3
	Night Vision 25	8%	12%	13%	63%	0.37	0.47	2.7	27%		73%	0.4
	Night Vision 35	7%	10%	19%	59%	0.41	0.47	2.7	19%		60%	0.5

**Save energy by day. Enhance views by night.**





Science.  
Applied to Life.™



### Bomb Blast and Explosion Protection

- ▶ Help protect people from flying glass shards, one of the most common causes of blast related injuries and fatalities

Completed Testing

- ▶ ASTM F1642
- ▶ GSA TS01-2003
- ▶ ISO 16933



### Safety Glazing and Human Impact

- ▶ Upgrade your glass to meet safety glazing codes\*
- ▶ Help protect your occupants from broken glass hazards

Completed Testing

- ▶ ANSI Z97.1
- ▶ 16 CFR CPSC 1201
- ▶ EN 12600



### Break and Entry

- ▶ Provides precious time by helping to deter unwanted individuals from entering your building or home
- ▶ Help protect occupants and assets

Completed Testing

- ▶ Independent lab evaluations, contact **3M** for details



### Seismic and Spontaneous Glass Breakage

- ▶ Help keep glass fragments from falling from your windows, helping to protect people and potentially reducing injuries on your property

Completed Testing

- ▶ ANSI Z97.1
- ▶ 16 CFR CPSC 1201

## Film Properties (nominal) — not for specification purposes

Film Type	Film Thickness	Construction	Tear Resistance	Tensile Strength	Break Strength	Elongation at Break	Peel Strength	Abrasion Resistance
Ultra 800	8 mil (0.20mm)	Micro-layered	1,200 lbs%	32,000 psi (220 MPa)	255 lbs/in (1,134 N / 25mm)	130%	> 6 lbs/in (27 N / 25mm)	<3%

**3M** products are tested to multiple industry standards. Glazing systems vary. Contact **3M** for more information.

\*Building codes vary, please consult with **3M** and your local code official.

# Our Clients

## Education-related Organisations:

Chun Tok School  
City University of Hong Kong  
ECF Saint Too Canaan College  
Fung Kai Innovative School  
Hong Kong Taoist Association Chan Lui Chung Tak Memorial School  
Ju Ching Chu Secondary School (Tuen Mun)  
Lok Sin Tong Lau Tak Primary School  
Man Kiu Association Primary School  
Maryknoll Convent School (Primary Section)  
Po Leung Kuk Dr. Jimmy Wong Chi-Ho Primary School  
Po Leung Kuk Luk Hing Too Primary School  
Po Leung Kuk Tong Nai Kan Junior Secondary College  
Pui Ching Primary School  
S.K.H. Wei Lun Primary School  
Saint Antonius Girls' College  
St. Andrew's Catholic Primary School  
St. Catharine's School for Girls  
St. Paul's Secondary School  
St. Paul's Co-educational College  
The Evangelical Lutheran Church of HK Wo Che Lutheran School  
The Hong Kong Institute of Vocational Education (Haking Wong)  
The Mission Covenant Church Holm Glad College  
TWGHs Kap Yan Directors' College  
TWGHs Leo Tung-hai Lee Primary School  
TWGHs Ma Kam Chan Memorial School  
TWGHs Sun Hoi Directors College  
TWGHs Wong Fung Ling College  
TWGHs Wong See Sum Primary School  
TWGHs Wong Yee Jar Jat Memorial Primary School  
Wai Chow Primary School

## Government Bodies and Public Facilities:

Agile Group  
Citibank Hong Kong  
City University of Hong Kong (CityU)  
Drainage Services Department  
Heliservices Limited  
HKSAR, Architectural Services Department  
Hong Kong Jockey Club  
Hong Kong Judiciary  
HKSH Medical Group Limited  
Hospital Authority  
Hong Yip Services Company Limited  
Harbour Place | Hung Hom  
MTR Corporation Limited  
New Life Psychiatric Rehabilitation Association  
Oasis Kai Tak | Kai Tak  
Po Leung Kuk Jolly Net  
River Cam Chinese Medicine & Acupuncture Clinic  
Sino Group  
Sinopec (HK) Petrol Filling Station Co.Ltd  
St. James' Settlement  
Tai Hung Fai Enterprise Co. Ltd. - Artique at Sheung Shui  
The Hong Kong Society for Rehabilitation  
The Henley | Kai Tak  
The Giverny | Pak Sha Wan  
West Kowloon Law Court Building  
Yan Chai Hospital  
Yang Memorial Methodist Social Service  
Yue Man Square

## Art Gallery and Museum :

Asia Art Archive  
M+ Museum, West Kowloon Cultural District  
Villepin

## F & B and Hospitality :

Bones and Blades  
Boy and Burger  
Bread Elements Limited- Bake House  
Café de Coral Holdings Limited  
Hong Kong Theme Park Limited (Disneyland)  
Koh Tom Yums | Discovery Bay  
Mira Moon Hotel  
Noah's Ark Hotel and Resort Ltd  
Nha Trang | Authentic Vietnamese Cuisine  
The Fullerton Ocean Park Hotel Hong Kong  
The Greater China Restaurant Co., Limited  
Tsui Wah Restaurant

## Designer / Architecture Firms :

Aedas  
Alto Plus Design Solution Group Limited  
Bean Buro  
Boss Design Ltd  
Cypress Design Ltd.  
Drops Design Company  
Hintegro  
Jones Lang LaSalle  
Lam's Construction  
LN Design Studio  
Meta4 Design Forum Ltd  
MJPM Design & Build  
PacificPlan Project Management Limited  
Pure AW's Designers Ltd  
Richards Basmajian  
Sky Construction Company Limited  
The Jardine Engineering Corporation

## Others :

Esthe Clinic  
Great Harvest Group  
GC Luckmate Limited  
Hong Kong Tenet Company  
Kader Holdings Company Limited  
Malca-Amit  
NextWave Yachting Limited  
Panasonic Life Solutions  
Refratechnik Asia Ltd.  
Synergy Distribution Limited  
Simpson Marine Limited  
Toppan Printing Co., (H.K.) Ltd.  
Toyota Tsusho (HK) Corporation Limited  
Total Group  
Trelleborg Sealing Solutions Hong Kong Ltd





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Ref: T-RE-L18249  
 Nov 28, 2018

To our dearest 3M Window Film's Authorized Applicators:

**The notification of Joint Warranty information updates**

This letter is to notify the joint warranty information updates for 3M and our Authorized Applicators regarding to 3M Sun Control Window Film and Safety & Security Film applications as below:

Film Model (Application)	Residential			Commercial		
	Standard	Maximum <sup>1</sup>	Open Window <sup>2</sup>	Standard	Maximum <sup>1</sup>	Open Window <sup>2</sup>
NV series / P-18 (interior)	3 years	3 years	1 year	3 years	5 years	1 year
PR series (interior)	5 years	5 years	1 year	5 years	10 years	1 year
PR ex series (exterior)	3 years (vertical)	3 years (vertical)	3 years (vertical)	5 years (vertical)	7 years (vertical)	3 years (vertical)
	TBC (slope / horizontal) <sup>3</sup>		N.A.	3 years (slope / horizontal) <sup>3</sup>	5 years (slope / horizontal) <sup>3</sup>	N.A.
PR S series (interior)	5 years	5 years	1 year	5 years	10 years	1 year
Ultra S series (interior)	5 years	5 years	1 year	5 years	10 years	1 year
Ultra S ex series (exterior)	TBC (vertical)		N.A.	TBC (vertical)		N.A.
	TBC (slope / horizontal) <sup>3</sup>		N.A.	TBC (slope / horizontal) <sup>3</sup>		N.A.
Neutral series (interior)	None			None		

<sup>1</sup> Pre-approval by 3M is required.

<sup>2</sup> Apply on interior size.

<sup>3</sup> Edge sealing is required.

Remarks: The information above is for reference only, it may change frequently without immediate announcement or notice. For the most updated warranty details, please contact 3M at your convenience.

If you have any question, please feel free to contact us.

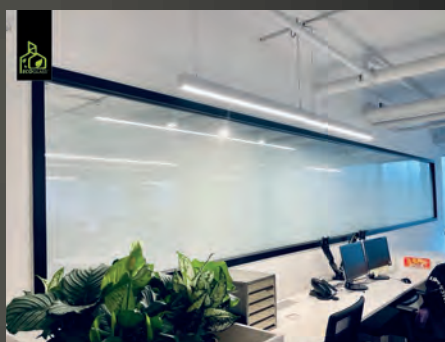
Yours faithfully,  
 3M Hong Kong Limited

Turis Li  
 Advanced Technical Service Engineer  
 Technical Department

# 3M Fasara Decorative Film



Illumina Black   Illumina Reflect   Illumina   Illumina-g   Aerina   Sabrina   Lontano   Tsurugi   Venetian





# JAG

**Signage & Graphics | 3D Signage | Digital Printing |  
Outdoor Billboard | Vehicle Signage and Branding**



## Local Printing

JAG Hong Kong brings you the most efficient and highest standards of creativity, workmanship, and customer support **FROM SIGN DESIGN AND PRODUCTION TO INSTALLATION.**



## Our Team

JAG Hong Kong has extensive **15 YEARS'** experience and knowledge in the graphic film industry both in **HONG KONG & NEW ZEALAND.**



## Our Company

JAG Hong Kong is the leading **GRAPHICS FILM INSTALLATION** company targeting graphic solutions for pre-existing, new build commercial spaces.

Our sign makers are there to help with your specific requirements every step of the way. Whether you're wanting regional or nationwide signage roll-out, your dedicated JAG Hong Kong contact will ensure delivery of your professional signage quickly and efficiently. We take pride in our work and we are committed to design and manufacture world-class signs for businesses and organizations throughout Hong Kong.



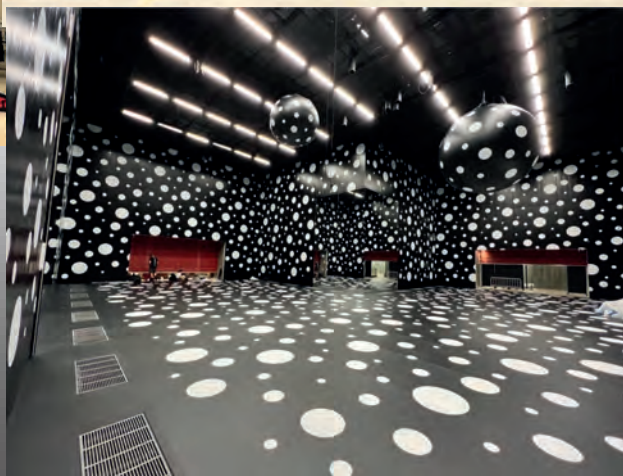


## EXHIBITION : YAYOI KUSAMA : 1945 TO NOW

LOCATION : M+, WEST KOWLOON DISTRICT

The most extraordinary and comprehensive exhibition about Kusama-San throughout her whole life showcasing over 7 decades and 200 original pieces of artwork.

JAG Hong Kong coordinated this extensive project from the conceptual idea sharing and creating, to material propositions and performance testing prior to installation. The result realised the perfect combination of colour and suitable graphic material throughout the execution of the project of over 1000 square meters of installation. Dots Obsession is still the largest retrospective of Yayoi Kusama in Asia outside Japan.







## HANG SENG BANK HEADQUARTERS, CENTRAL

To celebrate the 90th anniversary of Hang Seng Bank in 2023, upgrading project of the entire Hang Seng Head Office will be carried out in phases. JAG Hong Kong, working with the international illustrator Messy Desk, jointly completed the engineering of the hoarding. Over 10 meters in height and over 4000 meters squared, the hoarding was transformed into a 24-hour giant art exhibition area, exhibiting local artists to celebrate the 90th anniversary of Hang Seng, drawing illustrations with Hong Kong characteristics, conveying the brand value of Hang Seng.

Over 10 meter height,  
and average 4 meters **2,000m<sup>2</sup>**

Graphic sticker are installed



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[www.ecoglassasia.com](http://www.ecoglassasia.com)



ecoglassasia



Eco Glass - 3M Authorized Applicator



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